

# PATENT ABSTRACTS OF JAPAN

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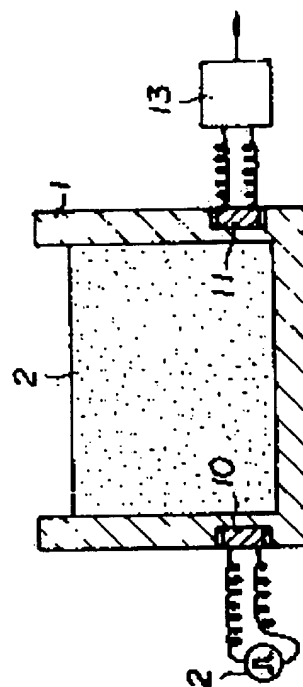
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## (54) INK DETECTOR FOR INK JET RECORDER

### (57)Abstract:

**PURPOSE:** To clearly detect the existence of an ink installing electroacoustic transducer elements opposed to each other inside the ink tank and detecting a sonic wave from one element by the other element.

**CONSTITUTION:** A pair of electroacoustic transducer elements 10, 11 consisting of a piezoelectric element or a magnetostriction element, etc. are installed opposed to each other inside or on the side wall of a ink tank 1. In the meantime, one conversion element 10 is excited by oscillator 12, transmitting a sonic wave into the ink tank 1. At the same time, this sonic wave is detected by the other conversion element 11. This detected signal is amplified/detected by an amplifier/detector 13 to detect the existence of ink 2 inside the ink tank 1. It is possible to easily and definitely determined whether there is ink 2 or air in the position of conversion elements 10, 11.



## LEGAL STATUS

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